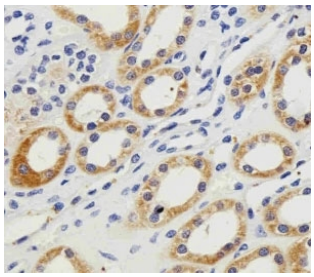
PGK1 Antibody / Phosphoglycerate kinase 1 (F50105)

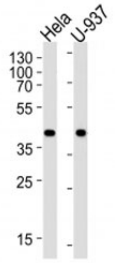
Catalog No.	Formulation	Size
F50105-0.4ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.4 ml
F50105-0.08ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.08 ml

Bulk quote request

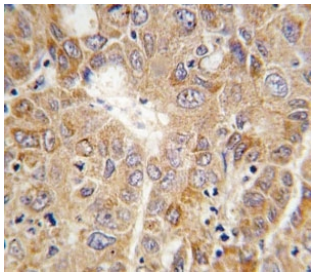
Availability	1-3 business days
Species Reactivity	Human, Mouse
Predicted Reactivity	Rat, Primate
Format	Purified
Host	Rabbit
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit Ig
Purity	Purified
UniProt	P00558
Localization	Nuclear, cytoplasmic
Applications	Western Blot : 1:1000 IHC (Paraffin) : 1:10-1:100 Immunofluorescence : 1:10-1:50 Flow Cytometry : 1:10-1:50
Limitations	This PGK1 antibody is available for research use only.



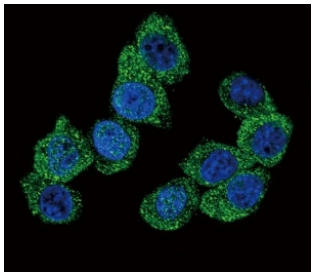
IHC analysis of FFPE human kidney section using PGK1 antibody; Ab was diluted at 1:100.



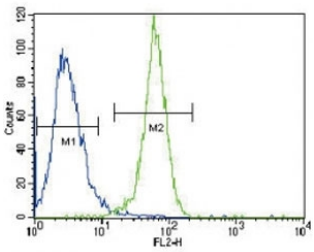
Western blot analysis of lysate from HeLa, U-937 cell lines using PGK1 antibody; Ab was diluted at 1:1000 for each lane. Expected/observed molecular weight ~44kDa.



IHC analysis of FFPE human hepatocarcinoma tissue stained with PGK1 antibody



Confocal immunofluorescent analysis of PGK1 antibody with HeLa cells followed by Alexa Fluor 488-conjugated goat anti-rabbit lgG (green). DAPI was used as a nuclear counterstain (blue).



PGK1 antibody flow cytometric analysis of HeLa cells (right histogram) compared to a negative control (left histogram). FITC-conjugated goat-anti-rabbit secondary Ab was used for the analysis.

Description

Also known as ATP:3-phosphoglycerate 1-phosphotransferase (EC 2.7.2.3), this major enzyme in glycolysis catalyzes the reversible conversion of 1,3-diphosphoglycerate to 3-phosphoglycerate, generating one molecule of ATP. New blood vessel formation or angiogenesis is critical for tumor expansion and metastasis. Lay et al. (2000) showed that the plasmin reductase isolated from conditioned medium of fibrosarcoma cells is the glycolytic enzyme phosphoglycerate kinase. They concluded that phosphoglycerate kinase not only functions in glycolysis but is secreted by tumor cells and participates in the angiogenic process as a disulfide reductase.

Application Notes

Titration of the PGK1 antibody may be required due to differences in protocols and secondary/substrate sensitivity.

Immunogen

A portion of amino acids 117-145 from the human protein was used as the immunogen for this PGK1 antibody.

Storage

Aliquot the PGK1 antibody and store frozen at -20oC or colder. Avoid repeated freeze-thaw cycles.